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THESIS

**NAVY CAPABILITIES AND MOBILIZATION PLAN
(NCMP) ANNEX Q – HEALTH SERVICES SUPPORT:
RESOURCE AND END STRENGTH IMPLICATIONS**

by

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December 1998

Principal Advisor:

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ANNEX Q – HEALTH SERVICES SUPPORT: RESOURCE AND
END STRENGTH IMPLICATIONS**

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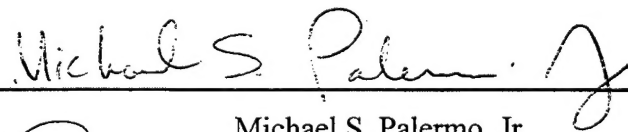
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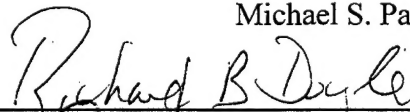
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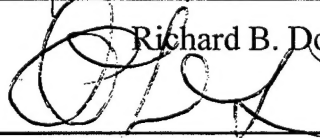


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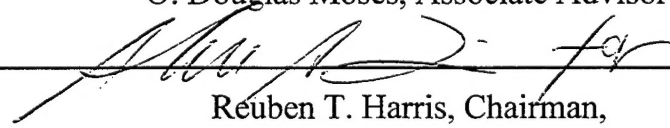
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ABSTRACT

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TABLE OF CONTENTS

I.	INTRODUCTION	1
A.	BACKGROUND	1
B.	RESEARCH OBJECTIVES	4
C.	SCOPE	4
D.	LIMITATIONS	5
E.	METHODOLOGY	5
F.	ORGANIZATION	6
II.	REVIEW OF NAVY READINESS REENGINEERING EFFORTS	7
A.	INTRODUCTION TO THCSRR	7
1.	Missions of Navy Medicine	8
2.	The Logic of the THCSRR	13
B.	READINESS REENGINEERING EFFORTS	17
1.	Medical Readiness Strategic Plan (MRSP)	18
2.	Force Medical Protection (FMP)	20
3.	Readiness Reengineering Plan (RRP)	21
C.	SUMMARY	26
III.	MILITARY PLANNING AND THE NAVY CAPABILITIES AND MOBILIZATION PLAN	29
A.	DEFENSE PLANNING	29
1.	Joint Strategic Planning System (JSPS)	30

B.	PLANNING.....	32
1.	Joint Operational Planning and Execution System (JOPEs).....	32
C.	BASIS FOR MILITARY PLANNING	34
D.	NAVY CAPABILITIES AND MOBILIZATION PLAN (NCMP).....	36
E.	ANNEX P TO NCMP, HEALTH SERVICES SUPPORT ANNEX.....	37
1.	Capabilities.....	39
2.	Mobilization Planning Direction.....	44
3.	Navy Casualty Rates	44
F.	ANNEX Q, PROPOSED CHANGES.....	45
1.	Planning Guidance	45
2.	Capabilities.....	46
3.	Navy Casualty Rates	52
G.	SUMMARY	53
IV.	UPDATE OF THE NAVY CAPABILITIES AND MOBILIZATION PLAN (NCMP).....	55
A.	RESPONSIBILITY FOR NCMP	55
B.	PROCESS TO UPDATE NCMP	57
C.	DRIVERS BEHIND UPDATE OF NCMP.....	58
D.	RESPONSIBILITY FOR ANNEX Q	60
E.	PROCESS TO UPDATE ANNEX Q.....	61
F.	THE ROLE OF MEDICAL DOCTRINE IN THE UPDATE OF ANNEX Q	64

G.	SUMMARY	66
V.	SUMMARY, CONCLUSIONS AND RECOMMENDATIONS FOR FUTURE STUDY	67
A.	SUMMARY	67
B.	CONCLUSIONS	69
C.	RECOMMENDATIONS FOR FUTURE STUDY	72
APPENDIX A.	MAJOR DOCTRINAL AND POLICY DEVELOPMENTS AFFECTING MEDICAL READINESS 1988-1999	75
APPENDIX B.	NCMP ANNEX P RESPONSIBILITY	77
APPENDIX C.	MILITARY HEALTH SYSTEM FIVE ECHELONS OF CARE	79
	LIST OF REFERENCES	81
	INITIAL DISTRIBUTION LIST	85

I. INTRODUCTION

A. BACKGROUND

The end of the Cold War presented numerous challenges to the assumptions that were fundamental to the process of military readiness planning. Major changes in post Cold War strategy led to changes in force structure, missions, and anticipated casualty rates. [Ref. 1] The United States Congress, in an effort to improve efficiency and save scarce resources, began to look at a post Cold War Department of Defense as a key area to reduce the budget.

Additionally, the lessons learned from operations conducted in this past decade, from the single Major Regional Conflict (MRC) -- Desert Shield/Desert Storm, to current peacekeeping and humanitarian operations such as Haiti, Cuba, and Bosnia, have been plentiful. No area of the military environment has escaped scrutiny, including the health service support system. These lessons learned, in conjunction with the strategic implications of the end of the Cold War and the downsizing of the Department of Defense, have impacted medical end strength and medical readiness policies.

As far back as 1985, Department of Defense medicine has been under revision. In the National Defense Authorization Act passed that year, Congress directed the Secretary of Defense to produce a plan for revising the organizational

structure of the military health care delivery system. [Ref. 2] This plan would enhance medical readiness by standardizing the methodology used to determine the number of personnel, force structure, and specialty mix necessary to support goals and objectives delineated in the Department of Defense's annual Defense Planning Guidance (DPG).

In Section 733 of the National Defense Authorization Act for fiscal years 1992 and 1993, Congress directed the Department of Defense to conduct a study of the military medical care system. [Ref. 3] The Department of Defense was directed to determine the size and composition of the medical system needed to support the armed forces during a war, or lesser conflict, in the post Cold War era. The study challenged the Cold War assumption that all medical personnel employed during peacetime are needed for wartime. Its conclusion that wartime medical requirements are much lower — by as much as half — than the medical system programmed for fiscal year 1999 raises the question of whether U.S. military medical forces should be reduced to only those needed for wartime [Ref. 4]. This study, commonly referred to as the 733 study, became a reference for many follow-on medical publications.

The Navy's initial response to these developments was the Total Health Care Support Readiness Requirement (THCSRR) model. This model was developed to precisely identify the readiness requirement for medical personnel

(officer, enlisted, active and reserve) to support both the day-to-day mission of the Navy and the most demanding go-to-war missions. In order to implement THCSRR, as well as address other changing requirements, Navy medicine created the Readiness Reengineering Plan (RRP). The RRP has recently stood-up Navy medicine's Readiness Reengineering Oversight Council (RROC), the Readiness Reengineering Task Force (RRTF) and its Tiger Teams (finance, operations, education and training, evaluation, marketing, fit force, project support), the Deployable Medical Platforms Advisory Council (DMPAC), and the Naval Health Services Doctrine Board (NHSDB).

One outcome of these changes is a proposed revision of the Health Services Support annex, Annex Q, of the Navy Capabilities and Mobilization Plan (NCMP), OPNAVINST S3061.1D. The purpose of the NCMP is to provide policy guidance for the phased expansion of approved support forces in the U.S. Navy. The NCMP provides the basis for Navy mobilization planning in consonance with the Joint Strategic Capabilities Plan (JSCP). [Ref. 5]

However, the NCMP was last published in April 1993 and, although it contained references to the 733 study, it was prepared prior to the collection of lessons learned from Desert Shield/Desert Storm. Additional lessons learned from medical missions conducted in support of peacekeeping and humanitarian operations have also been collected since the last publication of the NCMP.

B. RESEARCH OBJECTIVES

The main objective of this thesis is to answer the primary research question: What are the resource and end strength implications of the update of the medical annex of the Navy Capabilities and Mobilization Plan?

Secondarily, this thesis will also attempt to answer the following subsidiary questions:

- How has Navy medicine reorganized since the end of the Cold War?
- Within this context, what is the significance of the medical annex of the NCMP?
- What process has been used to revise the medical annex of the NCMP?
- What are the most significant impacts of the update to the medical annex of the NCMP?

C. SCOPE

This thesis will explore the background of the Navy Capabilities and Mobilization Plan (NCMP) and information concerning issues that brought about the proposed changes in the revision of the NCMP. This thesis will also include an examination of Navy medicine's reengineering process as well as the Total Health Care Support Readiness Requirement (THCSRR) model. It will provide a comparison between the old Health Services Support annex, Annex P, and the new

one, Annex Q. This thesis will attempt to identify the benefits the Department of Defense, and the Navy in particular, anticipates once the NCMP is implemented.

D. LIMITATIONS

The only limitation encountered in the research of this topic is that the Navy Capabilities and Mobilization Plan is in a draft version and not fully developed. This has limited the amount and type of documentation and information that is available for review. Much of the analysis conducted by this thesis on the medical end strength issue is based upon information that is a result of interviews conducted with key Navy personnel responsible for the Annex Q revision.

E. METHODOLOGY

Archival research methods were utilized to gather data for this thesis. Documents that were reviewed include, but were not limited to, Department of Defense reports, including Inspector General reports, GAO reports, congressional reports, pertinent Department of Defense directives and manuals, and interviews. Additional information was obtained through a review of current military periodicals, journals and the Internet. A comprehensive compilation of this data provided the basis for the information required to answer the research questions posed in this thesis.

F. ORGANIZATION

The first chapter of this thesis provides an introduction to the topic. The remaining chapters will strive to answer the primary research question as well as the subsidiary research questions.

Chapter II presents a review of the Navy Readiness Reengineering efforts to date, to include an introduction to the Total Health Care Support Readiness Requirement (THCSRR) model.

Chapter III will provide an introduction to the Navy Capabilities and Mobilization Plan (NCMP). This chapter will also provide a comparison of the old Health Services Support annex, Annex P, to that of the new one, Annex Q.

Chapter IV will discuss the process of updating the NCMP and its content and drivers.

Chapter V will conclude this thesis with a summary, conclusions, and recommendations for future study.

II. REVIEW OF NAVY READINESS REENGINEERING EFFORTS

This chapter will take a closer look at Navy medicine's response to changes that have impacted the Military Health System. Specifically, it will examine the Total Health Care Support Readiness Requirement (THCSRR) model and its component parts. It will also present a review of the Navy Readiness Reengineering efforts to date.

A. INTRODUCTION TO THCSRR

The National Defense Authorization Act for fiscal years 1992 and 1993 directed the Department of Defense to conduct an analysis of the fundamental economic issues bearing on the size of the military medical care system. [Ref. 3]

This legislation was the product of several factors, most notably the end of the Cold War and the subsequent downsizing of the Department of Defense and the continued growth in the cost of the military health care benefit. [Ref. 6]

The resulting study, conducted by the Office of the Secretary of Defense, Program Analysis and Evaluation, commonly called the "733 study," concluded that only half of the active-duty physicians projected to be available in Fiscal Year 1999 would be required to meet wartime demands. [Ref. 4] This assessment, coming on the heels of the findings of the Base Force, the first Medical Readiness Strategic Plan (MRSP) in 1988, and the lessons learned in Operation Desert

Shield/Desert Storm, further increased pressures to “rightsize” the military medical care system.

To meet the challenge for Navy medicine, the Surgeon General of the Navy commissioned detailed reviews of the Navy’s medical readiness requirements. The Center for Naval Analysis (CNA) was asked to “define Navy medical manpower requirements that were not covered in the 733 study.” [Ref. 7] The Office of the Surgeon General subsequently developed a new model, combining and revising the wartime portion of the 733 study and the CNA study. The Navy’s new model, a response to budgeting and legislative pressures to downsize, was the Total Health Care Support Readiness Requirements (THCSRR) model. This model allows Navy medicine to accurately determine and project its active duty manpower readiness requirements for the two readiness missions assigned to Navy medicine — wartime and day-to-day operational support to the fleet and Fleet Marine Force (FMF). The key to understanding how Navy medicine addresses its manpower readiness requirements is to examine the two missions of Navy medicine.

1. **Missions of Navy Medicine**

- a. *Readiness Mission*

The two missions of Navy medicine are termed the readiness mission and the peacetime benefit mission. The readiness mission is comprised of two

elements. The first of these, and one component of THCSRR, is to provide resources to meet Navy wartime medical requirements. The wartime mission is driven by Defense Planning Guidance that specifies the need to provide medical care in a scenario defined by two nearly simultaneous major regional conflicts (MRCs).

The 733 study categorized wartime requirements as either workload-based or structure-based.

Workload-based wartime medical requirements were constructed using force levels, arrival times, and combat intensities outlined in the Illustrative Planning Scenarios of the Defense Planning Guidance for fiscal years 1994-1999. [Ref. 7]

Using the guidelines provided by the Defense Planning Guidance, the Navy used an analytical tool known as the "Medical Planning Module (MPM)" to simulate admissions and define medical requirements. Input parameters for the MPM include wounded in action (WIA) rates, disease and non-battle injury (DNBI) rates, and evacuation policy. A DNBI rate was determined based on inputs from the Military Departments and historical information on Korea, Vietnam and Operation Desert Storm. [Ref. 7] WIA rates for the 733 study were based on Department specific methodologies. For the Navy, casualty rates were taken from the Navy Capabilities and Mobilization Plan (NCMP). "Casualty estimates are critical to the determination of wartime medical requirements." [Ref.

6] Evacuation policy is a function of decisions made by operational commanders concerning the maximum number of days of noneffectiveness a patient may be held for treatment within the theater of operation. Casualties that cannot be returned to active duty status within this time frame are evacuated. [Ref. 7]

Structure-based wartime requirements involve all medical personnel organic to specific units needed during wartime or to sustain wartime units. Many of these requirements were extracted from the Total Force Manpower Management System (TFMMS), commonly known as the "billet file." [Ref. 7] Wartime billets are linked directly to ships and Fleet Marine Force units through "Required Operational Capability and Projected Operational Environment (ROC/POE) for the Navy and Table of Organization and Equipment (TO&E) for the Marine Corps." [Ref. 8]

The wartime mission for Navy medicine also includes mobilizing two hospital ships, numerous fleet hospitals, providing augmentation of medical personnel to certain classes of ships, supporting the fleet and the Marine Corps' operations ashore and afloat, and maintaining outside of the Continental United States (OCONUS) military treatment facilities (MTFs) and dental treatment facilities (DTFs).

The second element of the readiness mission of Navy medicine, and another component of THCSRR, is the day-to-day operational support

requirement. The day-to-day operational component has "at its foundation a study completed in 1994 by the Center for Naval Analysis (CNA)." [Ref. 7] The basic premise of the CNA analysis is that there are certain billets and locations in the Navy medical community that must be filled for the Navy to perform its mission on a daily basis. These fall into two categories: the Peacetime Operational Force (POF) and the Continental United States (CONUS) rotation base needed to support the POF.

The Peacetime Operational Force category is comprised of billets with the fleet and Fleet Marine Forces OCONUS and those located in isolated sites within the United States (ICONUS). Fleet and Fleet Marine Force billets are similar to the organic billets previously discussed, but POF billets include only those which are required during peacetime.

Rotation base billets must be added to the day-to-day requirement because it is expected that personnel serving in operational assignments will be replaced periodically by personnel serving in non-operational billets. [Ref. 6]

To determine the Peacetime Operational Force, THCSRR focuses on personnel authorized in the billet file.

The CONUS rotation based category is needed to support the Peacetime Operational Force. The rotation base provides a pool of skilled and

trained active duty medical personnel from which to draw upon to relieve the Peacetime Operational Force billets.

An analytical tool called set theory was then applied to the data sets derived from the wartime medical requirements and the day-to-day operational support requirements. The objective was to find the "union" of the two data sets. Thus if the wartime and day-to-day requirements for General Surgeons were 100 and 50 respectively, the union of these two sets would be 100, the larger number. "The fundamental notion is that if a billet was needed for either the wartime or the day-to-day requirement, it had to be included in Navy medical end strength." [Ref. 6]

b. Peacetime Health Benefit Mission

The second mission of Navy medicine is the peacetime health benefit mission. This mission provides health care for 2.5 million beneficiaries through either direct care or the TRICARE system. While both missions are imperative to Navy medicine, it is the first mission, the wartime and day-to-day operational requirements that determines the number of active duty Navy personnel in uniform. The THCSRR does not address the peacetime benefit mission.

It is only because of these two readiness requirements that Navy personnel are available to support the second mission, the peacetime benefit mission, providing medical and dental care in the CONUS medical treatment facilities and dental treatment facilities. [Ref. 9]

2. The Logic of the THCSRR

The THCSRR model has two main components. The first component derives active duty manpower readiness requirements necessary to complete both readiness requirements. The second component programs the sustainment requirements needed to maintain the readiness manpower requirements for future years. The fact that certain billets are inherent in Navy medicine's readiness mission (wartime and day-to-day) prohibits the simple addition of the two sets of readiness requirements.

a. Medical Operational Support Requirements (MOSR)

The first component of the THCSRR is known as the Medical Operational Support Requirement (MOSR). The MOSR is obtained from a union of the manpower readiness requirements, denoted in both the wartime and day-to-day operational studies, at the subspecialty level. Through this union, the MOSR filters out redundancies yet is able to maintain unique billets.

The MOSR is derived by combining two databases. The first database included active duty requirements from the 733 study. The second database included active duty requirements from the CNA study, to include the rotation base needed to support this operational requirement.

A union of the requirements from these two studies resulted in a third set of requirements that define the minimum number of fully

trained active duty personnel required to accomplish both requirements. [Ref. 9]

b. Sustainment

Once the MOSR has been defined, giving us our first component, the second component of the THCSRR model can be determined by quantifying a sustainment requirement for the MOSR. Sustainment requirements allow for a continuous flow of qualified personnel into MOSR specified jobs as personnel attrite (either from the Navy or from their current skill level to a higher skill level). "Sustainment is composed of four elements: loss rates; training billets; mission continuity; and Transients, Patients, Prisoners, and Holding (TPP&H)." [Ref. 7] Loss rates are used to determine the number of medical personnel that must be recruited into the system to replace losses.

Training billets include Graduate Medical Education (GME) training billets and GME residency programs with the Residency Review Committee (RRC) of the American Council for GME (ACGME). [Ref. 7]

Mission continuity includes staff billets that provide the appropriate stability, senior credibility and experience for the rotation base. The TPP&H element incorporates personnel who are either in the hospital, in the process of moving, on legal or administrative hold, or in prison.

The sustainment requirement is the calculated number of billets required for officers and enlisted in training and must be added to the MOSR.

Therefore, adding the MOSR and the sustainment component together completes the THCSRR model and provides the total active manpower readiness requirement for Navy medicine. This is shown in Figure 1.

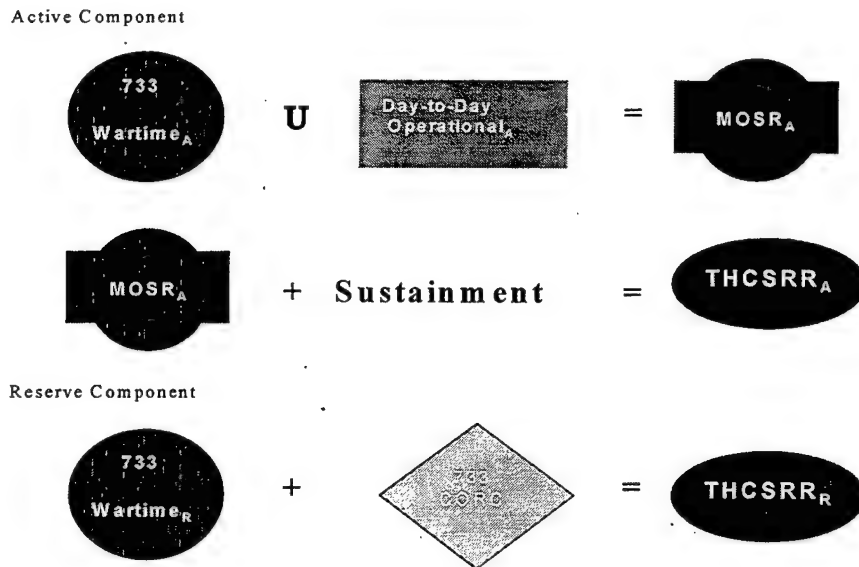


Figure 1. Total Healthcare Support Readiness Requirement (THCSRR) Model Defined

c. Strengths and Weaknesses

The THCSRR model has its benefits as well as some problems. The model is dynamic and it is able to accommodate changes made to the Department of Defense missions it is designed to support. The THCSRR model also has the capability to demonstrate the impact of changes in Navy medicine's mission priorities.

As the Department of Defense, the Joint Chiefs of Staff and the services make adjustments in strategic planning and force structure,

the THCSRR model can be used to generate new estimates for Navy medical personnel. [Ref.6]

Finally, the THCSRR model is valid in that the subspecialty-level union of wartime and day-to-day operational mission requirements allows Navy medicine to have credible requirements to present to Department of Defense and congressional manpower experts. The THCSRR model has been adopted by JCS, ASD (HA), OSD and other services as "the medical force structure sizing model for medical readiness manpower requirements." [Ref. 6]

There are also some potential problems with the THCSRR model that deserve some attention. Many of the critical data input parameters may be known only imprecisely and are determined in part by current capabilities and institutional incentives. Data input has an enormous impact on results of the model, especially in the complicated arena of manpower.

Lastly, the THCSRR model was a response to the 733 study. But the 733 study neglected the day-to-day operational mission of Navy medicine. As a result, the study was too narrow and did not fully define the continuum of Navy medicine. The 733 study is static, designed to provide a snapshot in time of the military health service support system, whereas the THCSRR is designed to be a dynamic model, capable of providing current information on medical readiness requirements.

Regardless of these issues, the Navy was the first of the military services' Medical Departments to have such a requirements model. Its implementation, through the Readiness Reengineering Plan, was important to ensure that Navy medicine will be able to meet its readiness mission.

B. READINESS REENGINEERING EFFORTS

Since the end of the Cold War there has been considerable change in national security strategies, military requirements and missions, and health care in the nation. These changes have impacted the Military Health System (MHS); they are the environments within which military medicine operates. Change, and the turmoil created by change, will likely continue into the future.

Within this environment,

[t]he MHS must meet the requirements and responsibilities of its twin missions: care and treatment for our troops wherever and whenever they need it (the readiness mission), and a high quality, cost-effective and accessible health care benefit for our other beneficiaries (the peacetime benefit mission). [Ref. 10]

Lessons learned from the Gulf War suggested that the level of medical readiness by each of the services was inadequate. [Refs. 11, 12, 13] In response to the criticism, the Department of Defense, along with the services, embarked upon initiatives to correct shortfalls in wartime medical capabilities and improve medical readiness. Congress, also addressing some medical shortcomings,

established the Defense Health Program in 1992 to centralize the budget for all military medicine.

The assumption behind the Defense Health Program is that the Department of Defense and Congress will be better able to understand, and therefore manage, spending for military healthcare if the programs were aggregated and therefore, more visible. [Ref. 6]

Those shifts required the development of a new joint health system strategy that maximized the synergistic effects of the services' medical elements through jointly coordinated, comprehensively planned and mutually supportive medical operations.

1. Medical Readiness Strategic Plan (MRSP)

In order to meet these requirements and to support both the wartime and health benefit missions of the MHS, the Department of Defense developed a medical plan.

In 1988, the Department of Defense published the first Medical Readiness Strategic Plan (MRSP) in response to a Congressional mandate to develop an integrated master plan for curing the ills of the wartime medical readiness system by the end of Fiscal Year (FY) 1992. [Ref. 14]

The strategy of the MRSP is to continuously improve overall medical capabilities to provide health services support to the Armed Forces.

Not long after the original MRSP was fielded, efforts to implement the plan were "overcome by major world and national events, which radically altered the

global security picture, and ultimately reshaped our National Military Strategy.”

[Ref. 14] These events were of such magnitude that “by 1995, a second edition had been prepared, reflecting much of what was then understood about the post Cold War security environment and the new health service support requirements.”

[Ref. 6] While developing new chapters for the MRSP, it was recognized that the original chapters were becoming dated and a series of panels was conducted to review the original chapters.

The third and most recent version of the MRSP was released in 1998 and is titled the MRSP 1998-2004. This latest edition makes accommodations for advances in technology and further reductions in the Armed Forces. It revises strategy to “take military medicine from the concept of definitive care in a theater of operations to one of essential care in theater, enhanced aeromedical evacuation and definitive care in the U.S.” [Ref. 10] The new concept fully supports the Chairman of the Joint Chiefs of Staff’s Joint Vision 2010, which was published in 1996. It provides for a healthy, fit and medically ready force with the ability to counter the health threat to the deployed force, and the provision of critical care and management for combat casualties. This is known as Force Medical Protection.

2. Force Medical Protection (FMP)

Force Medical Protection is defined as “a unified strategy that protects service members from all health and environmental hazards associated with military service.” [Ref. 15] It provides focus for a unity of effort and relies upon all the capabilities of the Military Health System for successful implementation. Force Medical Protection is best viewed as building upon a J-4 developed joint medical doctrine called the Joint Health Service Support (JHSS) 2010. It can be viewed as extending “the scope of joint medical doctrine and putting considerably more emphasis upon protecting forces from medical threats, especially within the combat theater.” [Ref. 6] The three pillars of Force Medical Protection, Healthy and Fit Force, Casualty Prevention, and Casualty Care and Management, are the basis for the Navy’s Naval Force Health Protection for the 21st Century (NFHP-21) concept.

The NFHP-21 is an enabler to the Navy and Marine Corps operational concepts Forward from the Sea and Operational Maneuver from the Sea, respectively, and is congruent with the National Military Strategy and Joint Vision 2010. The NFHP-21 concept represents a dynamic continuum that combines:

[p]eacetime engagement to create and maintain a healthy and fit force; a wartime deterrence to prevent casualties from disease and non-battle injury; and casualty care and management processes to minimize the medical logistics tail and to rapidly stabilize and transport casualties to the right level. [Ref. 16]

The MRSP and the services' medical reengineering programs "are addressing common goals: to be lighter, smaller, more mobile, and adaptable to different mission requirements." [Ref. 17]

3. Readiness Reengineering Plan (RRP)

As previously discussed, the Navy's initial response to the debate concerning the 'correct' size of Navy medicine was the creation of the Total Health Care Support Readiness Requirement (THCSRR) model. In order to implement THCSRR, as well as address other requirements, Navy medicine created the Readiness Reengineering Plan (RRP). The RRP is a comprehensive strategic plan to improve Navy medicine's preparedness for its Defense Planning Guidance assigned readiness missions. One definition of readiness is the ability of forces, units, weapon systems, or equipment to deliver outputs for which designed. "Additionally, JCS doctrine states that readiness requires (1) the right people, (2) with the right training (unit and individual), (3) with the right equipment, (4) in the right place at the right time." [Ref. 18]

To address the personnel issue, the implementation and continued refining of the THCSRR model will quantify the number of "the right people," and initiate actions required for readiness realignment. As force structure issues are being resolved, and firm implementation plans established, Navy medicine is moving to

realign its billet structure to put THCSRR at the core of every Medical and Dental Treatment Facility.

The Navy's response to "the right training" issue is the Readiness Realignment Plan. Often referred to as the "Galactic Radiator," this plan was developed to align major casualty care platforms with specific naval hospitals. See Figure 2. "Its premise is the THCSRR, the need to improve Navy medical readiness to account for lessons learned from Desert Shield/Desert Storm and to address certain changes in the post Cold War security environment." [Ref. 6] This alignment also clarified the requirement for actual readiness training facilities in peacetime, and those required for casualty care in wartime.

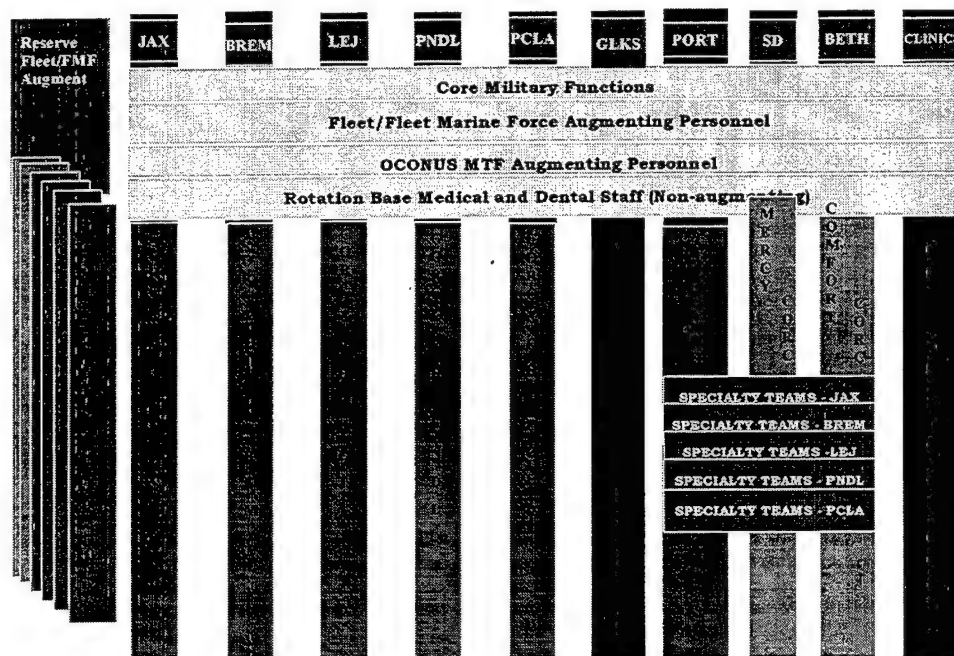


Figure 2. Readiness Re-Alignment Plan: *Unit Training*

One of the more heated topics in Navy medicine has revolved around the number of Medical Treatment Facilities required to meet the readiness mission. The Navy's response to this "right equipment" issue was the development of the CONUS Healthcare Readiness Infrastructure Sizing Model (CHRISM), as shown in Figure 3. This model looks at the individual readiness requirements for CONUS Medical Treatment Facilities: (1) care of wartime casualties, (2) unit readiness training, (3) rotation base for overseas and deployed personnel, and (4) THCSRR medical skills training. It then creates a union of the four requirements to determine the "minimum need for inpatient Medical Treatment Facilities." [Ref. 18]

CONUS WARTIME CASUALTY CARE	UNIT READINESS TRAINING Facility	Platform	ROTATION	THCSRR MEDICAL SKILLS TRAINING	LEADS
San Diego	San Diego	TAJL, 3 CRTS, FMF, OCONUS	San Diego	San Diego	San Diego
Portsmouth	Portsmouth	FI, 3 CRTS, FMF, OCONUS	Portsmouth	Portsmouth	Portsmouth
Bethesda	Bethesda	TAJL, 2 CRTS, FMF, OCONUS	Bethesda	Bethesda	Bethesda
C. Lejeune	C. Lejeune (Cherry Pt)	FI, FMF	C. Lejeune		C. Lejeune (Cherry Pt)
C. Pendleton	C. Pendleton (Lemoore)	FI, FMF	C. Pendleton	C. Pendleton	C. Pendleton (Lemoore)
Jacksonville	Jacksonville	FI, CRTS	Jacksonville	Jacksonville	Jacksonville
Bremerton	Bremerton Oak Harbor	FI	Bremerton	Bremerton	Bremerton (Oak Harbor)
Pensacola	Pensacola	FI	Pensacola	Pensacola	Pensacola
Great Lakes	Great Lakes	2 CRTS, OCONUS			Great Lakes

Figure 3. CONUS Healthcare Readiness Infrastructure Sizing Model (CHRISM)

Navy medicine is forward deployed throughout the world on a continuous basis. "Approximately 30 percent of Navy medical personnel are supporting forward-deployed operational and overseas units." [Ref. 18] It is with these statistics that the Navy responds to "the right time and place" issue.

a. Readiness Reengineering Oversight Council (RROC)

These pieces to the medical readiness puzzle -- THCSRR, Readiness Realignment Plan, and CHRISM -- go a long way toward defining Navy medicine's plan. The Readiness Reengineering Oversight Council (RROC) is one key to putting the pieces together.

The RROC was chartered in 1997 by then Navy Surgeon General Vice Admiral Harold M. Koenig. It provides flag officer level oversight of Navy medicine's readiness reengineering efforts.

The RROC is currently chaired by Navy Deputy Surgeon General Rear Admiral S. Todd Fisher and includes all of the Assistant Chiefs at the Bureau of Medicine and Surgery (BUMED MED-01 through MED-08, inclusive); the Director of Medical Resources, Plans and Policy on the Chief of Naval Operations staff (OPNAV N931); the Commander-in-Chief, Atlantic Fleet Surgeon; the Commander-in-Chief, Pacific Fleet Surgeon; and the Medical Officer of the Marine Corps. [Ref. 19]

The RROC exists to develop new doctrine, strategies and management systems to successfully meet the challenges of a new operational environment.

(1) Readiness Reengineering Task Force (RRTF). While the RROC provides oversight, three subordinate groups tackle the readiness reengineering initiatives. The first of these is the Readiness Reengineering Task Force (RRTF). The RRTF is an action officer level matrix organization composed of six functional teams. These six teams are Education and Training; Evaluation; Finance; Fit and Healthy Force; Marketing; and Operations. Currently, four of the six teams have constructed specific goals to assist them in achieving the RRTF's overall mission.

The mission of the Task Force is to guide the Program Objective Memorandum (POM) process with the goal of supporting Navy medicine's operational platforms with (1) the right personnel, (2) the right training, and (3) the right equipment. [Ref. 20]

(2) Naval Health Services Doctrine Working Group (NHSDWG). The second group under the RROC is the Naval Health Services Doctrine Working Group (NHSDWG). This group facilitates Navy medicine's input into the health service support doctrine development process.

The mission of the NHSDWG is to work in conjunction with the Naval Doctrine Command (NDC) and the Marine Corps Combat Development Command (MCCDC) on development of doctrine and selected tactics, techniques, and procedures for the establishment, deployment, and employment of health service support platforms in support of naval forces. [Ref. 21]

The NHSDWG will focus the scope of its work on augmentation medical forces for operational units including Marine Forces, large deck amphibious ships, and other units identified in the Navy Capabilities and

Mobilization Plan (NCMP). To date, the NHSDWG has completed updates, both revised and new, for the health service Naval Warfare Publication (NWP) series issued in April 1998.

(3) Deployable Medical Platforms Advisory Council (DMPAC). The third group under the RROC is the Deployable Medical Platforms Advisory Council (DMPAC). The DMPAC provides expertise on issues involving Casualty Receiving and Treatment Ships, Fleet Hospitals, Hospital Ships and other deployable medical platforms. "The purpose of the DMPAC is to serve as a forum to link reengineering and doctrinal efforts with platform considerations." [Ref. 22] Additionally, under the DMPAC, the Consolidated Integrated Logistics Support Working Group (CILSWG) exists to provide expert advice on medical logistics issues and facilitate a continuous process of improvement and interoperability across the deployable medical platforms.

All of these pieces of the RROC organization meet at a minimum of semi-annually, with most meeting more frequently, in an effort to implement THCSRR and keep the readiness reengineering efforts on course for the future of Navy medicine.

C. SUMMARY

Navy medicine has responded positively to a myriad of changes that have impacted the Military Health System. In order to meet evolving readiness

missions, the Navy developed a model that calculated the personnel needed, both active and reserve, to support both wartime and day-to-day requirements of Navy medicine. That model is known as the Total Health Care Support Readiness Requirement (THCSRR) model. To assist in the implementation of THCSRR and to address other changing requirements, the Navy developed the Readiness Reengineering Plan (RRP). These are the key components to Navy medicine's readiness reengineering efforts intended to address issues associated with rightsizing the MHS after the Cold War.

III. MILITARY PLANNING AND THE NAVY CAPABILITIES AND MOBILIZATION PLAN

This chapter will address some of the planning systems utilized by the Department of Defense in formulating strategic plans. It will also provide an introduction to the central focus of this thesis, a Navy-unique planning document called the Navy Capabilities and Mobilization Plan (NCMP). Finally, this chapter will provide a comparison of the old Health Services Support annex to the NCMP, Annex P, to that of the proposed new one, Annex Q.

A. DEFENSE PLANNING

The purpose of the Department of Defense Planning, Programming, and Budgeting System (PPBS) is to produce a plan, a program, and a two-year budget for the Department of Defense, with the ultimate objective of furnishing the combatant commanders with the best mix of forces, equipment, and support attainable within fiscal constraints. The PPBS is a cyclic process containing three distinct, but interrelated phases, i.e., Planning, Programming and Budgeting. The Chairman of the Joint Chiefs of Staff (CJCS) provides the Secretary of Defense with specific programming recommendations through the Joint Strategic Planning Process (JSPS). [Ref. 23]

1. Joint Strategic Planning System (JSPS)

The JSPS provides the strategic foundation for all Department of Defense planning. It is the

[f]ormal means by which the CJCS, in consultation with the other members of the Joint Chiefs of Staff (JCS) and the combatant commanders, discharges his responsibility to give strategic plans and direction to the Armed Forces of the United States and to interact with other Department of Defense systems. [Ref. 24]

The JSPS establishes the formal process for review of the national security strategy and all functions necessary to achieve national security objectives. There are numerous documents associated with the JSPS. Many of these documents, such as the Defense Planning Guidance (DPG) and the Contingency Planning Guidance (CPG), provide input or feedback to the JSPS.

The DPG fulfills the Secretary of Defense's responsibility to provide the services with policy guidance for the preparation of their program recommendations and budget proposals. While the DPG's primary purpose is establishing the Secretary's programming guidance to the military departments for the development of their Program Objective Memorandums (POMs), it also provides the defense strategy and the planning guidance to support that strategy.

[Ref. 23] The DPG includes

[m]ajor planning issues and decisions, strategy and policy, strategic elements, the Secretary's program planning objectives, the Defense

Planning Estimate, the Illustrative Planning Scenarios, and a series of studies. [Ref. 24]

The DPG is the key link between the JSPS and the PPBS.

The CPG is the means by which the Secretary of Defense, in consultation with the CJCS, fulfills the annual requirement to provide written policy guidance to the CJCS for the preparation and review of contingency plans. [Ref. 23] The President must approve the finalized CPG. The CPG directly affects the formulation of the Joint Strategic Capabilities Plan (JSCP). The JSCP, and the National Military Strategy (NMS), are just two of the numerous products of the JSPS.

a. National Military Strategy (NMS)

The NMS furnishes to the

President, the National Security Council, and the Secretary of Defense the advice of the CJCS, in consultation with other members of JCS and the combatant commanders, as to the recommended national military strategy and fiscally constrained force structure required to support attainment of national security objectives. [Ref. 24]

The NMS assists the Secretary of Defense in preparing the DPG and provides strategic direction for the development of the JSCP.

b. Joint Strategic Capabilities Plan (JSCP)

The JSCP contains guidance to the Commanders in Chiefs (CINCs) and Service Chiefs for accomplishing military tasks and missions based on current

military capabilities. These assignments take into account the capabilities of intelligence information, available forces, and guidance issued by the Secretary of Defense. The JSCP directs the development of contingency plans to support national security objectives by assigning planning tasks and apportioning major combat forces and strategic lift capability to the combatant commander. It constructs a coherent framework for giving capabilities-based military advice to the National Command Authority (NCA). It is designed to be reviewed biennially and is the principle document that assigns tasks to the combatant commanders to develop operations plans, Concept Plans with or without Time-Phased Force and Deployment Data (TPFDD), and functional plans using deliberate planning procedures.

B. PLANNING

1. Joint Operational Planning and Execution System (JOPES)

The process of joint operational planning is defined as “a coordinated joint staff procedure used by a commander to determine the best method of accomplishing assigned tasks and to direct the action necessary to accomplish the mission.” [Ref. 24] The staff of a combatant command must consider many factors in its planning in order to select the best means of conducting a military mission.

The Joint Operational Planning and Execution System (JOPES) details an established, orderly way of translating the contingency planning task assignments into plans or orders. JOPES is directed by the Department of Defense to be used as the process for joint planning. The particular procedures used in joint planning depend upon the time available to accomplish them. The amount of time available to the staff significantly influences the planning process. JOPES uses two different methods of planning.

a. Deliberate or Peacetime Planning

The first method of planning utilized in JOPES is known as the Deliberate or Peacetime Planning method. It is the process used when time is not a critical factor and permits the total participation of the commanders and staffs of the joint community. Development of the plan, coordination among supporting commanders and agencies, the services, reviews by the Joint Staff, and conferences can take many months to develop. The plan is based on predicted conditions that will be countered with resources available during the planning cycle. The product of Deliberate Planning is called an operations plan that can be either an OPLAN, CONPLAN, or Functional Plan, depending on the level of detail that is included.

b. Time-Sensitive or Crisis Action Planning (CAP)

The second method of planning utilized in JOPES is known as Time-Sensitive or Crisis Action Planning (CAP) method. CAP is conducted in response to crises where U.S. interests are threatened and a military response is being considered. While deliberate planning is conducted in anticipation of future hypothetical contingencies, CAP is carried out in response to specific situations as they occur and that often develop very quickly. The time available for planning is short and the near-term result is expected to be an actual deployment and/or employment of military forces. The overall process of CAP parallels that of Deliberate Planning, but is much more flexible to accommodate requirements to changing events and NCA requirements. The product of CAP is called a Campaign Plan or an OPORD, depending on the level of detail that is included.

C. BASIS FOR MILITARY PLANNING

The process of planning a joint operation produces a contingency plan for military action. It begins with a national strategy stated by the President, supported with the funding resources by Congress, and is defined by the task assignments published by the CJCS. The players in the planning process include the NCA (President and Secretary of Defense); their advisors, supporting executive-level agencies and a group collectively called the Joint Planning and Execution Community (JPEC). [Ref. 24] The civilian leadership decides the

preliminary direction of contingency operations and approves the final plans. The JPEC publish the task-assigning documents, review the products and approve the final version of peacetime plans. JOPES translates the assignments into plans or orders based upon time available.

The military service chiefs have developed a series of documents that support, direct, and guide component commanders based upon strategic guidance in CJCS taskings and program and budget guidance. Each service has unique documents that are used in the planning system and have specific application in the development of joint plans in support of the JSCP. The JSCP identifies major combat forces and each component command develops its own total force list composed of combat, combat support, and combat service support forces using the service unique planning documents. The Air Force uses the Air Force War and Mobilization Plan (WMP), the Army uses the Army Mobilization Operations Planning and Execution System (AMOPES), the Marine Corps uses the Marine Capabilities Plan (MCP), and the Navy uses the Navy Capabilities and Mobilization Plan (NCMP). [Ref. 24] The JSCP also furnishes planning guidance that prioritizes and deconflicts planned employment of forces that are apportioned to more than one CINC.

D. NAVY CAPABILITIES AND MOBILIZATION PLAN (NCMP)

Service documents provide specific service planning guidance in support of the JSCP. The supporting Navy document is the Navy Capabilities and Mobilization Plan (NCMP). Both the JSCP and the NCMP are instrumental in the development of CINC OPLANs. The JSCP provides information on “apportionment of above the line or combat forces while the NCMP provides data on apportionment and sourcing of below the line or combat support forces.” [Ref. 5] The NCMP provides Navy planners with overall mobilization policy and procedures as well as mission-specific mobilization direction and capabilities. It identifies, for planning purposes, availability of Navy combat support forces for use by Navy Component Commanders (e.g., Fleet Commanders in Chief (FLTCINCs)) in support of the Unified Commanders. The discussion that follows with regard to the NCMP and Annex P is based upon the most current published version of this document, 2 April 1993, and may not reflect current requirements or capabilities. Discussion of Annex Q reflects the most recent policies and capabilities that are proposed for the revised draft NCMP due out in FY 99.

The NCMP provides specific guidance and information on:

- Mobilizing naval forces for prompt and sustained combat
- Apportionment and sourcing of active and reserve support forces to the FLTCINCs for planning purposes

- Employment and administration of the U.S. Coast Guard when operating as a service to the U.S. Navy
- The mobilization process for Reserve Forces, with step-by-step procedures from call up through demobilization
- Development of Manpower Mobilization and Support Plans (MMSPs) by Echelon 2 Navy Commanders in support of the FLTCINCs
- Participation in the development and evaluation of Joint Operation Plans (OPLANs) by commanders of naval component commands
- Naval functional capabilities. [Ref. 5:p. 1-1]

The NCMP is composed of a series of annexes with each annex focused on a particular naval function or mission area. [See Appendix B] References are included in each annex to facilitate further research and more detailed study, as required. Particular emphasis has been placed on the areas of mobilization of personnel and logistics, and the apportionment and sourcing of noncombatant Naval Forces.

E. ANNEX P TO NCMP, HEALTH SERVICES SUPPORT ANNEX

Annex P, Health Services Support discusses medical and dental support. It provides direction and guidance for Mission and Authority, Mobilization and Support Concepts, Mobilization Plans and Resources, Medical Planning Factors, Medical Logistics Support (i.e., medical materiel apportionment), and Mission Taskings. [Ref. 5:p. P-1] Annex P focuses initially on policy guidance for

planners with respect to the mission, role, authority, medical support, and research, development, test and evaluation (RDT&E) that will be provided by the Navy Medical Department.

The first issue discussed in Annex P deals with the mission of Navy medicine as it relates to the NCMP. The mission of Navy medicine is to conserve manpower by returning personnel to full duty as soon as possible, preventing disease and injury, restoring functional health and well being, and minimizing disability. The peacetime role of Navy medicine is to provide effective health care services and to maintain a readiness to rapidly support the operating forces with a highly trained and operationally oriented force capable of treating casualties in an integrated Chemical, Biological, and Radiological (CBR) and conventional environment. [Ref. 5:p. P-1]

The Bureau of Medicine and Surgery (BUMED) is responsible for the provision of medical and dental care to the Fleet, Fleet Marine Force (FMF), and the shore establishment. During contingency/wartime, BUMED provides medical department personnel to meet the augmentation requirements of both the Fleet and FMF. Additionally, BUMED OCONUS Commands transfer to their respective FLTCINCs when directed to provide the command and control and staff necessary to direct medical support provided by expanded fixed Medical Treatment Facilities (MTFs).

1. Capabilities

a. *Casualty Receiving and Treatment Ships (CRTS)*

Annex P also lists the capabilities that exist for planning purposes to provide medical care to casualties generated during a conflict. The first of these capabilities is the Casualty Receiving and Treatment Ships (CRTS). These are the ships designated within the Amphibious Task Force (ATF) that will provide initial resuscitative care (Echelon 2) [See Appendix C] and medical and dental support to the Landing Force (LF) until the mission is completed or until the ships are tasked with a follow-on mission. In order to achieve full casualty handling capability, these ships require augmentation by large numbers of medical department personnel. ATF ships suitable for use as CRTSs are the Amphibious Assault Ship (Multipurpose) (LHD), the Amphibious Assault Ship (General Purpose) (LHA), and the Amphibious Assault Ship (Helicopter) (LPH). [Ref. 5:p. P-3] Only these three ship types are designated for medical personnel augmentation.

(1) Amphibious Assault Ship (LHD). The LHD (Multipurpose) is the newest, largest, and most versatile amphibious assault ship. It also has the largest medical capability of any amphibious ship currently in use. The medical spaces include six operating rooms and 604 beds, of which 528 are designated as overflow beds. LHDs require augmentation by 343 medical department personnel (73-Officer and 270-Enlisted) to achieve full casualty treatment capability. Additionally, Class VIII Materiel (medical

material) is prepositioned for the LHD in Authorized Medical Allowance List (AMAL) blocks, with each AMAL block providing a predetermined amount of supplies, equipment or resupply. The LHD Class VIII Materiel quantity consists of four AMAL blocks, two Surgical, one Surgical Resupply and one Surgical Support. [Ref. 5:p. P-4]

(2) Amphibious Assault Ship (LHA). The LHA (General-Purpose) ship has a smaller medical capability than the LHD. Its medical spaces include four operating rooms and 367 beds, of which 300 are designated as overflow beds. LHAs require augmentation by 170 medical department personnel (44-Officer and 126-Enlisted) to achieve full casualty treatment capability. It contains the same size Class VIII Materiel support as the LHD, i.e., four AMAL blocks of supplies. [Ref. 5:p. P-5]

(3) Amphibious Assault Ship (LPH). The LPH (Helicopter) ship is the smallest of the three ships designated as a CRTS. Its medical spaces include two operating rooms and 220 beds, of which 200 are designated as overflow beds. The LPH requires augmentation by 115 medical department personnel (41-Officer and 74-Enlisted) to achieve full casualty treatment capability. The LPH requires only three AMAL blocks of Class VIII Materiel support, two Surgical and one Surgical Resupply. [Ref. 5:p. P-6]

b. Other ATF Ships

Annex P also lists other ATF ships, but not as suitable CRTS platforms. They are mentioned only to inform the Commander Amphibious Task Force (CATF) of potential overflow capabilities to treat and transport combat patients, if required. All required medical personnel augmentation should be from within the ATF. No medical augmentation is planned for those ships. Additionally, no Class VIII Materiel is prepositioned for these ships. These ships are the Amphibious Transport Dock (LPD), the Dock Landing Ship (LSD), Amphibious Cargo Ship (LKA), Tank Landing Ship (LST), and the Amphibious Command Ship (LCC). [Ref. 5:p. P-7]

Other capabilities that exist within the Navy medicine continuum that are covered under Annex P are Overseas Medical Facilities, CONUS Medical Activities, Mobile Medical Augmentation Readiness Teams (MMARTs), Blood Product Support in Emergency, Dental Facilities, and Medical Department Deployable Systems Capabilities.

c. Overseas Medical Facilities

Overseas Medical Facilities are fixed MTFs generally capable of providing medical/dental (Echelon 4) [See Appendix C] care for a specified number of operating beds based upon staffing criteria. Overseas medical facilities are "located along Sea Lines of Communication (SLOC) and in the

Communication Zone(s) (COMMZ) of potential theaters of combat operations in order to support deployed Navy/Marine Corps forces as well as Joint Operations.”

[Ref. 5:p. P-7]

d. CONUS Medical Activities

CONUS Medical Activities provide medical/dental care (Echelon 5) [See Appendix C] to naval forces and other eligible beneficiaries, and represent the contingency mobilization base for the readiness training and professional development of personnel. These facilities also serve to care for returning casualties. [Ref. 5:p. P-7]

e. Mobile Medical Augmentation Readiness Teams

MMARTs are a system of specialty teams and medical supply blocks capable of rapid response to various peacetime contingencies. These teams are maintained in an alert status at all times to facilitate rapid response. [Ref. 5:p. P-7]

f. Blood Product Support in Emergency

The Blood Product Support in Emergency is part of the Navy Blood Program (NBP). This capability can be expanded in response to an emergency within the Navy or in concert with the blood programs of other military departments. [Ref. 5:p. P-8]

g. Dental Facilities

Dental Facilities are the shore-based dental facilities that provide service to Navy and Marine Corps personnel. [Ref. 5:p. P-8]

h. Medical Department Deployable Systems Capabilities

The Medical Department Deployable Systems Capabilities consist of the Rapidly Deployable Medical Facility (RDMF), Fleet Hospitals and Hospital Ships (T-AH). The RDMF is a highly mobile, erectable, and relocatable shore-based medical system (Echelon 3) [See Appendix C]. It is staffed and equipped to render resuscitative care to casualties resulting primarily from an amphibious operation.

The Fleet Hospital is a 500 bed shore-based, surgically intensive facility capable of providing care in the Combat Zone (CBTZ) (Echelon 3) and COMMZ (Echelon 4) [See Appendix C]. Fleet Hospitals are preconfigured and propositioned to meet medical support requirements. There are 12 Fleet Hospital packages, with manpower provided by active and reserve Fleet Hospitals. [Ref. 5:p. P-9]

The Hospital Ship is an afloat, surgically intensive, acute care hospital (Echelon 3) [See Appendix C]. The Navy operates two Hospital Ships, the USNS MERCY (T-AH 19) and the USNS COMFORT (T-AH 20). The MERCY is based out of San Diego, California and the COMFORT is based out of

Baltimore, Maryland. Both are maintained in Reduced Operating Status-5 (ROS-5) and can get underway within 5 days with all required medical and nonmedical staffing and 30 days of supply. [Ref. 5:p. P-10]

2. Mobilization Planning Direction

Annex P also covers Mobilization Planning Direction covered under Department of Defense policy guidance for wartime. It covers definitions for this planning as well as guidelines for the mobilization plan, to include descriptions of actions required to support each phase of naval mobilization.

3. Navy Casualty Rates

Annex P is concluded with an appendix, Appendix P-I, Navy Casualty Rates (NCR). The discussion here will be limited, as this appendix is classified. NCR had been developed by the David Taylor Research Center for shipboard personnel and by Naval Health Research Center (NAVHLTHRSHCEN) for both Navy personnel ashore and Naval DNBI. The Navy Casualty Rates Ashore were developed by NAVHLTHRSCEN for the following categories: Forces Organic to USMC, Mobile Forces, and Personnel Stationed at Fixed Sites. These rates were derived from data gathered in Vietnam (Light Combat), Korea (Moderate Combat), Okinawa (Heavy Combat), and Iwo Jima (Intense Combat). As was previously noted in Chapter II, casualty rate estimates are vital to determining wartime medical requirements. [Ref. 6]

F. ANNEX Q, PROPOSED CHANGES

As is the case with many military planning documents, they are designated as "works in progress." That is, they take into account the constantly changing environment within which the Department of Defense operates. The NCMP, as a planning document, is no different in this regard. It has been updated numerous times since its inception and continues to be reviewed as required. The most recently published version of the NCMP, dated 2 April 1993, is in the process of being updated by the Chief of Naval Operations (CNO). As expected, Annex P, Health Services Support, had some changes to be incorporated into the update.

The first of these changes is readily apparent; the annex will be designated as Annex Q vice Annex P. This was done in order to reflect nomenclature consistent with FLTCINC literature and to align the medical portion of all orders/plans.

1. Planning Guidance

The remaining changes are not quite as obvious but play an important part in understanding the changes in Navy medicine and the progress of Navy medicine's readiness reengineering efforts. One of the first changes is noted under Planning Guidance, as Navy planners have addressed the issue of Augmentation.

Not previously alluded to in Annex P, augmentation deals with the staffing of platforms to their maximum extent possible. Augmentation deals with manning

priorities based on the warfighting CINCs' time phased requirements for medical support. These are listed in order of general priority: 1) CRTS, 2) USMC Forces/Division/Wing/Force Service Support Group (FSSG), 3) Hospital Ships (T-AH), 4) Fleet Hospitals, OCONUS, and 5) CONUS MTFs and Staff Headquarters. [Ref. 25]

This prioritization is important because it addresses the medical personnel augmentation "systems" problems identified in Operation Desert Shield/Desert Storm and follow-on peacekeeping and humanitarian operations.

2. Capabilities

a. Casualty Receiving and Treatment Ships

The next change addressed in the draft Annex Q is in the area of Medical Department Capabilities. The capabilities of Casualty Receiving and Treatment Ships (CRTS) have been adjusted to reflect recent review changes. Of note, the Navy decommissioned all remaining LPH Amphibious Assault Ship (Helicopter) platforms, thus eliminating that capability from Annex P. Therefore the medical department personnel augmentation of 115 (41-Officer and 74-Enlisted), as well as the Class VIII Materiel support was eliminated in Annex Q. Changes were also made to the two remaining CRTSs (LHD and LHA) with regard to their respective medical capabilities/spaces, medical department personnel augment, and Class VIII Materiel support. [Ref. 25]

(1) Amphibious Assault Ship (LHD). The LHD now lists its medical spaces to include four operating rooms and 60 beds. This is a decrease of two operating rooms and 544 total bed spaces. This decrease eliminates all overflow bed spaces (528) listed in Annex P capabilities. Logically, with a reduced medical capability, it would follow that the personnel and equipment needed to support this reduced capability should be reduced as well. In order to achieve full treatment capability, the LHDs now require a total HSS augment of 100 personnel (42-Officer and 58-Enlisted). This denotes a reduction of 243 total personnel (31-Officer and 212-Enlisted) required from Annex P. The Class VIII Materiel supply prepositioned onboard each ship in this class is now two AMAL blocks, one Surgical Resupply and one Orthopedic Surgical Resupply. This is a reduction of two AMAL blocks of supply required from Annex P. [Ref. 25]

(2) Amphibious Assault Ship (LHA). The other CRTS, the LHA also lists its medical spaces to include four operating rooms and 60 beds. This is a decrease in bed spaces only, a total of 307. Again this decrease eliminates all overflow bed spaces (300) listed in Annex P capabilities. To achieve full casualty treatment capability the LHAs now require a total HSS augment identical to the LHDs, i.e., 100 personnel (42-Officer and 58-Enlisted). This is a reduction of 70 total personnel (2-Officer and 68-Enlisted). The Class VIII Materiel supply prepositioned on each ship in this class is again identical to that of

the LHD, that is, two AMAL blocks, which also denotes a reduction of two blocks of supply required from Annex P. [Ref. 25]

b. Other ATF Ships

For planning purposes, under the category of Other ATF Ships, the Amphibious Cargo Ship (LKA) and Tank Landing Ship (LST) were deleted from Annex P due to the decommissioning of these classes of ship.

c. Overseas Medical Facilities

With regard to Overseas Medical Facilities, no changes were made to the generic capabilities of these MTFs, but Annex Q updates information for OCONUS MTFs that will receive additional medical augmentation personnel. These facilities are U.S. Navy Hospitals (USNAVHOSPs) Guam, Okinawa, and Yokosuka. Annex Q lists a breakdown of their Active/Inactive and Expanded bed capabilities. [Ref. 25] This information will help planners for mobilization of personnel and movement of casualties.

d. CONUS Medical Activities

Annex Q also provides previously unpublished information for planners regarding CONUS Medical Activities. It lists facilities that provide direct support to the care of returning casualties (CORC) mission of the United States Atlantic Command's (USACOM) Integrated CONUS Mobilization Plan (ICMOP). [Ref. 25] The list details the Active/Inactive and Expanded bed capabilities of the

following facilities: NNMC Bethesda, NMC Portsmouth, NH San Diego, NH Bremerton, NH Camp Pendleton, NH Jacksonville, NH Pensacola, NH Great Lakes, and NH Camp Lejeune.

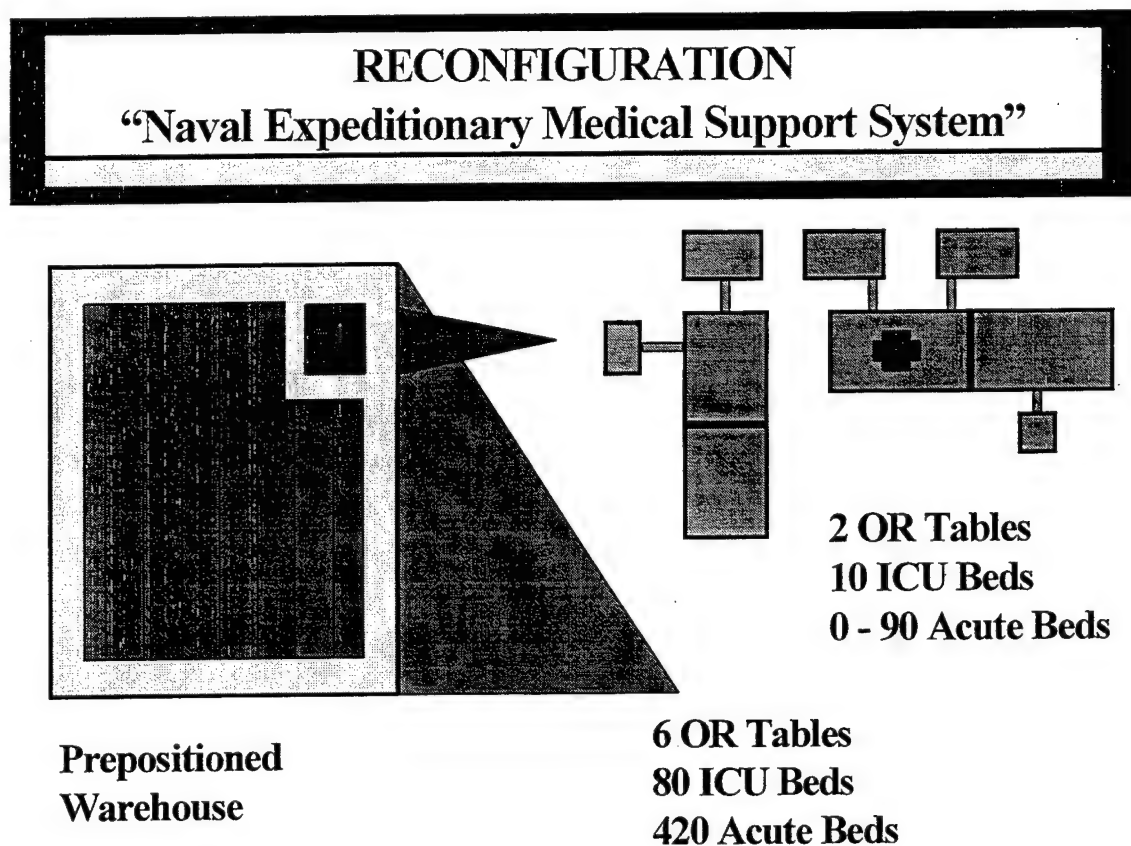
e. Fleet Surgical Team (FST)

A new capability within both the HSS and Annex Q is the Fleet Surgical Team (FST). The FST concept has augmented the old MMARTs concept used in Annex P. FSTs are 16-man medical augmentation teams permanently assigned to the FLTCINCs. They consist of trained HSS personnel to meet the CINCs' routine and amphibious deployment medical requirements and to provide Echelon 2 [See Appendix C] medical support to the operating forces, Fleet and Marine Forces (MARFOR) exercises and scheduled deployments of Amphibious Ready Groups (ARG). [Ref. 25] FSTs are normally deployed as a unit on a CRTS of the ARG and are part of the personnel augmentation package to LHA/LHD deploying platforms.

f. Medical Department Deployable Systems Capabilities

Another change in Annex Q addresses the capabilities listed under Medical Department Deployable Systems Capabilities. The Rapidly Deployable Medical Facility (RDMF) listed in Annex P has been eliminated and replaced by the concept of the Naval Expeditionary Medical Support System (NEMSS) Fleet Hospital (FH) Package. This system is capable of providing modular subsets of a

FH with all equipment, materials, supplies, and manpower to come from existing FH manpower requirements, equipment and supply lists. [See Figure 4] It is capable of providing limited austere medical care in Smaller Scale Contingencies (SSCs), Operations Other Than War (OOTW), or disaster/humanitarian relief operations. [Ref. 25] Its medical core functional areas include casualty receiving, operating room preparation and hold, and surgical suites. Those areas are provisionally staffed to meet a limited combat mission.



**Figure 4. Naval Expeditionary Medical Support System (NEMSS)
Fleet Hospital (FH) Package**

g. U.S. Marine Corps Health Services Support Operations

While the Navy and Marine Corps are two distinct organizations within the same military department, their combat missions require coordinated medical planning for support of joint and amphibious operations. Coordinated Navy and Marine Corps medical and logistics planning at all organizational levels is necessary for employment of medical department assets to ensure the most effective medical support.

With this idea in mind, Annex Q now lists U.S. Marine Corps Health Services Support Operations under the heading of Capabilities in Annex Q. This includes HSS to Marine Expeditionary Forces (MEF), Medical Battalion and Dental Battalion. Within the Medical Battalion, the Marine Corps has restructured its organization to update the new capabilities of the Surgical Company and the Shock Trauma Platoon, both of which have been designed to deliver a more mobile, responsive capability to the casualty. [Ref. 26]

h. Other Health Service Support

The final proposed change to Annex Q is another addition to both HSS and Annex Q Capabilities. Listed under Other Health Service Support, the Forward Deployed Laboratory (FDL) represents a new capability. The primary mission of the FDL is to provide public health support within the task force by rapidly diagnosing militarily relevant infectious diseases and biological threat

agents during deployments. The FDL provides the Task Force Commander with “a rapidly deployable, portable, state-of-art, diagnostic capability to meet specialized needs of evolving contingencies.” [Ref. 25]

3. Navy Casualty Rates

One area that has not been updated, but is critical to determining wartime medical requirements, is the Casualty Rates. The David Taylor Research Center has not been tasked to update the data it used to generate the rates for Annex P. There has been much discussion as to which Navy functional area has the responsibility to develop these rates and, to date, none has been developed for inclusion into the draft of the NCMP. [Ref. 8]

The casualty rate estimate is the most significant planning factor in determining what network of medical assets will be needed to support a combatant commander. The casualty rate estimate is one of the key inputs for medical requirements planning models used to identify wartime medical manpower requirements. Since the late 1970's, the military has used the Medical Planning Module (MPM) to assist the medical planner in predicting and evaluating medical requirements in support of OPLAN development. However, the MPM has been criticized and labeled as “outdated and inaccurate” by many agencies familiar with medical planning. [Ref. 27]

The model developed to replace the MPM is the Medical Analysis Tool (MAT). The MAT has been in use since 1997, providing medical planners with a “highly accurate and sufficiently flexible model that as changes occur in planning factors and technology, the MAT can change with them.” [Ref. 27] This new model, along with updated casualty estimate rate inputs from the NCMP, will provide a much more accurate prediction of wartime requirements to support planning.

G. SUMMARY

The Department of Defense, in the course of its operations, attempts to use standardized systems in its planning process in an effort to increase efficiency. The outcomes of these planning systems are numerous reviews, guidance, strategies and plans. One of these plans is the Joint Strategic Capabilities Plan (JSCP). Service documents provide specific service planning guidance in support of the JSCP. The supporting Navy document is the Navy Capabilities and Mobilization Plan (NCMP).

The NCMP is a guide for CINCs that lists the capabilities of forces available for augmentation purposes. Navy Health Services Support is addressed in an annex to the NCMP. This annex discusses the medical and dental support capabilities available to the commander. Many proposed HSS changes have been

recommended for the current update of the NCMP, based upon technology improvements and changes in medical readiness doctrine.

IV. UPDATE OF THE NAVY CAPABILITIES AND MOBILIZATION PLAN (NCMP)

This chapter will examine the revision of the Navy Capabilities and Mobilization Plan (NCMP), with a focus on the update to the Health Services Support annex, Annex Q. It will also look at the responsibilities, process and drivers behind the update of this planning document.

A. RESPONSIBILITY FOR NCMP

As discussed previously, the NCMP is the Navy-unique document that supports the JCS Joint Strategic Capabilities Plan (JSCP). It provides Navy planners with overall mobilization policy, in fulfillment of requirements established by Annex N (Mobilization) to the JSCP, and procedures, as well as mission-specific mobilization direction and capabilities. [Ref. 5] The NCMP describes Navy capabilities and sets forth required force levels for planning under various regional contingencies.

The NCMP is composed of a series of annexes, with each annex focusing on a particular naval function or mission area. Annex responsibility is parceled out to the specific OPNAV office (N code) coordinating that particular subject matter. [See Appendix B] The NCMP is prepared by the Chief of Naval Operations, with the Director of Strategy, Plans, Policy and Operations Division (N3/N5) ultimately responsible for its publication. It is considered to be continuously effective for

planning purposes and should be updated biennially in conjunction with the publication of the JSCP. [Ref. 28]

With the 2 April 1993 version of the NCMP being its most recent, the Navy has fallen well short in its biennial obligation to update the document. A memorandum from then OP-06 (now N3/N5) initiated the required review and update of the NCMP for FY 95 as per the JSCP. [Ref. 29] The revision was initiated and staffed, but for reasons unknown was never signed off and therefore never implemented. Some latitude could be given in that the JSCP was not updated during the 1993-1996 time period either. However, until recently, the latest JSCP available to planners was the 1996 publication (the JCS released a 1998 update in October of this year). There are a number of reasons given as to why no revision for the NCMP was conducted until this year.

We begin with a brief look at the time period involved, the early to mid 1990's, recognizing that this was a tumultuous time for the entire Department of Defense structure, including the Navy. As all the services looked to meet personnel end strength cuts mandated by Congress, no area escaped "chopping block" scrutiny. In 1992, the Navy reorganized its OPNAV offices in an attempt to meet Congressional mandates. This reorganization served two purposes, first, it was part of the Navy required active duty strength reduction, and second, this

aligned "the structure and functions of OPNAV offices" with their Joint Staff counterparts. [Ref. 30]

This OPNAV reorganization was in addition to the normal personnel assignment rotation that generally produces a state of flux in many offices. Prior to this reorganization, a single individual within the then OP-06 division was responsible for the NCMP. It was this individual's sole job to track and make appropriate changes to the document. [Ref. 29] As a result of the reorganization effort, this individual was transferred to another OPNAV office. While the responsibility for the NCMP remained within the now N3/N5 division, no one was assigned that requirement until February 1998. The result was obvious, no revision could be completed until someone was assigned the responsibility to do so.

B. PROCESS TO UPDATE NCMP

In February 1998, the N3/N5 section initiated the required review and update of the NCMP for FY 99 in congruence with the expected release of the JSCP. Since the NCMP greatly impacts the reserve component, plans went into effect with the idea that the reserve units would take the lead effort and work closely with the OPNAV office responsible for each annex. Additionally, N3/N5 placed a request for a select reservist (SELRES) to act as the overall coordinator

for this project. This individual would be placed on active duty for six months at a time or longer to supervise the revision.

In March 1998, an organizational meeting was held with all the cognizant OPNAV offices to develop a timeline for the NCMP revision. A June 1998 due date was established with a plan for the final draft to be reviewed at the Navy Planners Conference (NPC), scheduled to convene in August 1998. Although timeline activities were pushed back a bit, the basic work of the revision was updated and compiled as planned. The date of release of the JSCP was pushed back, as was the date for the NPC. In October 1998, the NPC met with a goal to review each of the revised annexes of the NCMP and get the FLTCINC planners' input. That goal was met and the final revisions and submissions were due in November 1998. As of this date, a majority of the final revisions have been submitted to the N3/N5 division and it is still striving for a compilation/distribution date of late January 1999. [Ref. 29]

C. DRIVERS BEHIND UPDATE OF NCMP

The prime reason behind the need to revise or update a product is change. Change generally leads to some form of obsolescence. The same could be said for the NCMP. Prior to the end of the Cold War, our nation's military strategy was one of global conflict. The main enemy was clear, i.e., the former Soviet Union and its Warsaw Pact partners. The Cold War strategy was built around mass and

power, depending upon large numbers of forward-deployed assets. Scenarios were based on a slow buildup of assets that would give us overwhelming combat power and that would eventually participate in a protracted, direct combat type of war.

As the Soviet Union and the Warsaw Pact deteriorated, our nation's military strategy changed as well, from one of global conflict to that of a two Major Regional Conflict (MRC) strategy. The strategy is based upon the concepts of forward presence and power projection. Scenarios are now based on a rapid deployment of assets that would eventually participate in a short war. Instead of the goal of overwhelming combat power, it now focuses on decisive combat power with the use of technologically improved smart or standoff weapon systems. [Ref. 31]

However, a wider access to this advanced technology along with modern weaponry, including weapons of mass destruction (WMD), will increase the number of actors with sufficient military potential to upset existing regional balances of power. This modern weaponry is sufficiently powerful that smaller numbers can dramatically alter threats facing today's military forces. A number of potential adversaries may acquire the military hardware to make themselves distinctly more dangerous.

In sum, today's military must prepare to face a wider range of threats, emerging unpredictability, employing varying combinations of technology, and providing a challenge at varying levels of intensity.

These threats have been the driving factor behind the changes in our supporting military doctrine. This is important to understanding the incentives behind the revision of the NCMP. To emphasize the importance of the military doctrinal changes that have occurred over the past decade, it is worth taking a brief look at those doctrinal publications that have impacted the current revision of the NCMP.

The following doctrinal publications were referenced in the revision of the NCMP: Concept of Operations/Strategy: A National Security Strategy for a New Century, May 1997; National Military Strategy of the United States of America, 1997; Joint Vision 2010; Defense Contingency Planning Guidance (no date); From the Sea, 1992; Forward from the Sea, 1994; and Operating Forward from the Sea, 1997. [Ref. 29] All of these doctrinal publications address the changing threat environment and have impacted heavily upon the revision of the NCMP, including Annex Q.

D. RESPONSIBILITY FOR ANNEX Q

Annex Q, the Health Services Support annex, is one of the 26 separate annexes that make up the NCMP. The update and revision of each annex is tasked

to a specific OPNAV office. The OPNAV office, or N code, responsible for Annex Q is N931, the Medical Resources, Plans and Policy Division. As the responsible OPNAV office, N931 went through a process similar to that used by N3/N5 to update Annex Q.

E. PROCESS TO UPDATE ANNEX Q

Just as the NCMP is considered to be continuously effective for planning purposes until revised, so is Annex Q. N931, along with the other NCMP responsible OPNAV offices, received the N3/N5 NCMP revision memorandum in February 1998. However, through both excellent planning and early initiative, N931 had started the process of updating Annex Q prior to the receipt of the memorandum.

Recognizing that the mission and the structure of the Navy and the Marine Corps was changing, N931, in concert with Navy medicine's Readiness Reengineering efforts, took an in depth look at the impact that these changes would have on Annex Q. These strategic changes, when combined with advances in the practice of medicine, created a change in many of the capabilities addressed in the medical annex. It was with these changes in mind that N931 developed a "Truth in Advertising" campaign and took these changes to the medical service community in November/December 1997. [Ref. 32]

The main focus of this campaign was the attempt to identify the real medical capabilities of the Casualty Receiving and Treatment Ships (CRTS) and the LHA and LHD class ship. Previously overstated capabilities were replaced with more realistic and reasonable ones. N931 had observed the medical portion of the Kernel Blitz '96 exercise that utilized the CRTS during the course of the evolution. The medical facilities of the CRTS, when tested using different scenarios, were stretched beyond their limits. Further observation revealed that when attempting to incorporate the medical personnel augment necessary to reach this overstated capability, there was insufficient berthing space available for the augment. N931, utilizing lessons learned from this evolution, previous exercises and recent real world operations, then went about revising the capabilities of the CRTS to meet more realistic standards. The result was the "Truth in Advertising" campaign which reduced dramatically the stated medical capabilities of the CRTS. [Ref. 32]

This did not, initially, meet with approval from the Marine Corps Health Services personnel. [Ref. 32] These planners, a mix of Navy and Marine Corps personnel, vehemently argued that this reduction in capability would greatly affect Marine Corps warfighting efforts. However, over the course of the November 1997-January 1998 time period, N931 was able to convince the Marine Corps that these capabilities had previously been overstated and that the new capabilities

advertised were more realistic. [Ref. 32] N931 was also able to convey that these changes were brought about by the change in military strategy, as well as improvements to medical service that resulted from the strategic changes, highlighted in the reorganization of Marine Corps Health Service Support. [Ref. 26]

Upon receipt of the N3/N5 memorandum, N931 was able to continue its campaign and put out draft updates to OPNAVINST 3105.J, Required Operational Capabilities (ROC) and Projected Operational Environment (POE) for deploying platforms to the Atlantic Fleet (LANTFLT) and Pacific Fleet (PACFLT) medical personnel for input. N931 did this without incorporating the detailed numbers (personnel and equipment) they had developed. This was done in an effort to have LANTFLT and PACFLT medical departments provide uncensored data feedback based on their expertise. [Ref. 32] The feedback from both medical departments was returned by May 1998. This input was then matched against the numbers developed by N931 and incorporated into the "final" draft. The data returned was quite close to the numbers developed by N931. A finalized version was quickly sent back out to the fleet medical departments for any additional input. [Ref. 8]

With relatively few changes, N931 was able to quickly incorporate this CRTS capability into the Annex Q revision, along with other changes, and thus have it ready for review at the NCP in October 1998.

F. THE ROLE OF MEDICAL DOCTRINE IN THE UPDATE OF ANNEX Q

Clearly, as threats and planning scenarios change, medical requirements to support the missions will change as well. Future planning scenarios are likely to be based on smaller populations at risk, lower casualty rates, different assumptions about which casualties are treated in theater and in the United States, and which of the patients evacuated to the United States are to be treated in military and civilian hospitals.

One doctrinal publication that has had tremendous impact on the revision of Annex Q is the Marine Corps' concept of Operational Maneuver from the Sea (OMFTS). Briefly, this concept reinforces our National Security Strategy of being globally involved to help spread the tenets of democracy and to assist countries and regions to stabilize and become productive economic participants in the world marketplace. The missions range from disaster assistance to peacekeeping to peacemaking to conflict and war. OMFTS will assist in carrying out those missions by rapidly projecting the appropriate force to the area of need. In most instances, this will be a highly mobile, flexible, technologically expert, tailored force package prepared to deploy anywhere in the world. [Ref. 33]

This change in warfighting concept involves creating a smaller forward footprint. Navy medicine, as a supporting service to the Fleet Marine Forces, must also be organized as flexible, agile and technologically adept.

It was with this concept in mind that the Naval Doctrine Command, in conjunction with the Marine Corps Combat Development Command (MCCDC), developed an activity model for providing combat casualty care in support of OMFTS. The model recommended a number of changes for Navy medicine. The first of these was to shift the primary focus of combat medicine from return-to-duty care (which requires a large HSS footprint) to preventive care. Second, Trauma care capability inherent in the maneuver forces would be increased based upon technological advances providing great future potential. Third, the Navy would develop task-based HSS in the form of rapidly assembled Medical Capabilities Packages (MCP) to support the dynamics presented by tomorrow's naval operations (wartime, contingency and peacetime). Finally, future shore-based hospitals would be structured as modular units capable of "rapid deployment, employment and re-deployment." [Ref. 34]

These recommendations are evident in the updates made to Annex Q. The revision of the CRTS medical capability is based on the smaller fighting force envisioned in OMFTS. As fallout of this smaller force, a reduction in the expected casualty rate and bed space is incorporated into this capability. Also, the medical personnel augmentation package to support this capability has been greatly

reduced as well. Additionally, the Class VIII Materiel supply support (AMAL blocks) has been reconfigured, resulting in a sizable decrease in weight and cargo space requirements.

New capabilities addressed in Annex Q are the Fleet Surgical Teams (FST), Forward Deployed Laboratories (FDL) and the Navy Expeditionary Medical Support System (NEMSS) dimension of the Fleet Hospital. All of these provide greater prevention or care at the point of injury while simultaneously keeping pace with the maneuver element.

The doctrine behind the update of Annex Q is centered on the changes in military strategy, Navy medicine's efforts to support these changes in a more efficient manner and the advances of technology in medical practices.

G. SUMMARY

This chapter examined the revision of the NCMP and its Health Services Support annex, Annex Q. It identified the organizations responsible for the revision, the N3/N5 division's responsibility for the overall NCMP update and the N931 division's role in the update of Annex Q. The chapter also covered the process used by each of these divisions in the revision of their respective areas and the factors influencing the process. Lastly, the chapter described the medical doctrine changes behind this revision of the NCMP, most of which stems from the turmoil created in the post Cold War decade and the strategic changes that occurred from that fallout.

V. SUMMARY, CONCLUSIONS AND RECOMMENDATIONS FOR FUTURE STUDY

A. SUMMARY

The lessons learned from operations conducted in this past decade, from Desert Shield/Desert Storm up to the current peacekeeping and humanitarian operations, have been plentiful for all areas of the Department of Defense. The focus of this thesis has been in the area of health service support. These lessons learned, in conjunction with the strategic implications of the end of the Cold War and the downsizing of the Department of Defense, have widely impacted medical end strength and medical readiness policies. Appendix A identifies the significant events associated with these lessons learned.

Navy medicine has responded positively to these developments. The initial response was the development of a model that calculated the personnel needed, both active and reserve, to support both wartime and day-to-day requirements of Navy medicine. That model is known as the Total Health Care Support Readiness Requirement (THCSRR) model.

To assist in the implementation of THCSRR and to address other changing requirements, the Navy developed the Readiness Reengineering Plan (RRP). These are the key components to Navy medicine's readiness reengineering efforts intended to address issues associated with rightsizing the Military Health System

(MHS) after the Cold War. One of the tools with which the Navy will address these changing requirements is a document used in support of operational planning, the Navy Capabilities and Mobilization Plan (NCMP).

The Department of Defense, in an effort to increase efficiency, utilizes standardized systems for operational planning. The Joint Strategic Capabilities Plan (JSCP) is just one of the many plans, reviews and strategies that is generated by this planning system. The JSCP contains guidance to Commanders In Chiefs (CINCs) and Service Chiefs for accomplishing military tasks and missions based on current military capabilities. Service documents, such as those described in Chapter III, provide specific service planning guidance in support of the JSCP. The supporting Navy document is the NCMP.

The NCMP is a guide for CINCs that lists the capabilities of forces available for augmentation purposes. Navy Health Services Support is addressed in one of the 26 annexes to the NCMP. This annex details the medical and dental support capabilities available to the commander. As a result of the numerous changes in medical readiness doctrine and technological improvements, many changes have been proposed for the current update of the NCMP.

The NCMP is currently in its final stages of revision and is projected to be published in late January 1999. The Director of Strategy, Plans, Policy and Operations Division, N3/N5, is ultimately responsible for the publication of the

NCMP. The Medical Resources, Plans and Policy Division, N931, is the responsible OPNAV office, or N code, for the Health Services Support annex, Annex Q. The process used by both of these divisions in the revision of their respective areas and the factors influencing the process were detailed here.

This thesis also reviewed the medical doctrine changes behind this revision of the NCMP and Annex Q. Most of these stem from the turmoil created in the post-Cold War decade and the strategic changes that occurred from that fallout.

B. CONCLUSIONS

The update of the medical annex, Annex Q, of the NCMP has impacted both resources and medical end strength within the Navy. The ultimate goal of this revision is to update and list those capabilities available to the commander.

As a result of the revision process, one resource, the Class VIII Materiel supply support (AMAL blocks) has been reconfigured. This reconfiguration has resulted in a sizable decrease in weight and cargo space requirements for the AMAL blocks. This resource savings is passed on to the Marines on board the Casualty Receiving and Treatment Ships (CRTS). This reduction has created additional cargo space, which can be turned back over to the Combat Cargo Marines and used for other activities. This cargo space equates to three additional High Mobility Multi-Wheeled Vehicles (HMMWV) that can be placed aboard ship. [Ref. 8]

The resource savings from the revision of Annex Q can be viewed in fiscal terms as well. The AMAL block reconfiguration leads to approximate savings of \$20,000 per CRTS (LHA or LHD). [Ref. 8] With 11 total CRTS, the initial reconfiguration, when completed, will result in a total savings of \$220,000. Eventually, over the life cycle of these classes of ships, the cost to replace or restock the AMAL blocks will be reduced as well, but by how much is unknown at this time.

Another area impacted by the update of the medical annex is medical end strength within the Navy. As a result of N931's "Truth in Advertising" campaign, the medical capabilities of the CRTS have been dramatically altered. This alteration is based on a smaller fighting force envisioned in many strategic documents, thus reducing expected casualties and bed space capability needed in the CRTS. For the LHD class ship, the revision of Annex Q resulted in a reduction of 544 total bed spaces, including all 528 overflow bed spaces. The LHA class ship experiences a reduction of 307 total bed spaces, including all 300 overflow bed spaces.

The medical personnel augmentation package to support this capability has been reduced as well. For the LHD class ship, the revision of Annex Q resulted in a reduction of 243 medical personnel (31-Officer and 212-Enlisted). For the LHA class ship, it has resulted in a reduction of 70 medical personnel (2-Officer and 68-

Enlisted). The Navy currently has six LHD class ships and five LHA class ships in operation. This would suggest an overall medical personnel savings of 1,458 (186-Officer and 1,272-Enlisted) for the LHDs and 350 (10-Officer and 340-Enlisted) for the LHAs.

This, however, would be an incorrect calculation. The actual savings would be situational because not all 11 ships are underway at any given time. It should also be pointed out that this personnel augmentation is an on-call capability, not a required one.

A second common error encountered when calculating the resource savings from the Annex Q revision deals with the possible monetary savings involved with the decreased augment package. Although the medical personnel augment package savings appear obvious, it is actually a very difficult and confusing process to define any fiscal savings in this area. The Defense Health Program in support of the CINCs pays for the augment packages. Any savings that come from this augment reduction do not necessarily go to the Navy. Nor, for that matter, can they be viewed as a dollar for dollar savings for the Defense Health Program.

The augment personnel are removed from a Medical Treatment Facility (MTF) and eventually replaced by medical reservists to carry out the requirements at that particular MTF. Essentially, any medical end strength savings would be reduced by the purchase of that productive capability left open by the augment.

[Ref. 35] That could be done either by the method described above or through outsourcing to private facilities. This must be done because the MTF from which the augment was pulled retains a peacetime mission to provide care. Thus, a “make versus buy” decision must be determined in order to evaluate any real fiscal savings as a result of the NCMP revision. [Ref. 35]

C. RECOMMENDATIONS FOR FUTURE STUDY

The process of conducting the research for this thesis has led to several recommendations for future study in this area.

The first of these is in the area of changes to the NCMP. The Navy’s failure to meet the biennial revision obligation imposed by the JSCP exposed some problems in the update process. This process used to update the NCMP could be more efficient if it mirrored the JCS approach and was updated during annual Service planning conferences. Quarterly or even semi-annual updates would ensure the NCMP revision process is always moving forward, rather than waiting for the biennial revision process.

Finally, access to the NCMP on a Navy secure computer would improve the overall process of putting together a revision. Due to the significant importance of these planning documents, this area warrants future study.

A second recommendation for future study is in the area of casualty rate estimation. The casualty rate estimate is probably the most significant factor in

determining wartime medical requirements. Unfortunately it is one of the requirements that is currently incomplete and could create delays in the publishing of the NCMP. Because of its significant impact on requirements generation, this area warrants future study.

A final recommendation for future study is in the area of medical end strength. As noted in the thesis, the revision of Annex Q has led to an obvious reduction in the medical personnel augment package for the CRTS. Because of the void created by the augment package, a cost versus benefit analysis of the "make versus buy" decisions to fill that void must be conducted. The impacts on the force structure of Navy medicine and the potential for saving money in an ever-decreasing budget are significant enough to warrant future study in this area.

APPENDIX A. MAJOR DOCTRINAL AND POLICY DEVELOPMENTS AFFECTING MEDICAL READINESS 1988-1999

1988	Medical Readiness Strategic Plan I published
1990-91	Operation Desert Storm
1991	Congress directs 733 study DoD adopts Base Force
1992	Joint Strategic Capabilities Plan (FY 93) published
1993	Navy Capabilities and Mobilization Plan (FY 93) published
1994-95	Services begin reengineering deployable hospitals and reorganizing other medical readiness functions DoD conducts Bottom Up Review
1994	DoD completes 733 study
1995	Medical Readiness Strategic Plan II published Joint Pub 4-02, Doctrine for Health Services Support in Joint Operations published
1995	Joint Strategic Capabilities Plan (FY 97) published
1997	JHSS Vision 2010 initiated by JCS DoD conducts Quadrennial Defense Review
1998	Medical Readiness Strategic Plan III published Joint Pub 4-02 revised Force Medical Protection initiated by JCS, replacing JHSS Vision 2010

Joint Strategic Capabilities Plan (FY 99) published

1999

Navy Capabilities and Mobilization Plan (FY 99) published?

APPENDIX B. NCMP ANNEX P RESPONSIBILITY

<u>ANNEX</u>	<u>OPNAV CODE</u>	<u>TITLE</u>
A	N2	Intelligence
B	N402	Logistics
C	N514	Theater Nuclear Force Policy
E	N512	Special Warfare
F	N512	CW, CBR Defense, and Use of Riot Control Agents and Herbicides
H	N85	Command, Control and Communication (C3)
I	N096	Oceanography Program
J	N421	Mobility
K	N512	Composite Matters
L	N312	U.S. Coast Guard
M	N644	Electronic Warfare
N	N1R	Manpower Mobilization
	N511	Forces
P	N932	Health Services Support
Q	N643	Space Program
R	N41	Advanced Base Functional Component (ABFC)
S	N866	Amphibious Warfare
T	N865	Antisubmarine Warfare

V	N86	Inshore Undersea Warfare
W	N866	Mine Warfare
X	N3T/N5T	Naval Control of Shipping
Y	N445	Naval Construction Force
Z	N865	Strike/Antisurface Warfare
AA	N87	Submarine Warfare
BB	N312	Continuity of Operations Plan
CC	N3	Security Groups
DD	N09C	Public Affairs
EE	N161	Automatic Data Processing (ADP)
FF	N413	Navy Cargo Handling Force

APPENDIX C. MILITARY HEALTH SYSTEM FIVE ECHELONS OF CARE

1. Echelon I

Care is rendered at the unit level and includes self and buddy aid, examination, and emergency lifesaving measures.

2. Echelon II

Care is rendered at a MHS organization by a team of physicians or physician assistants, supported by appropriate medical, technical, or nursing staff. At this level, care includes basic resuscitation and stabilization and may include surgical capability, basic laboratory, limited x-ray, pharmacy, and temporary holding facilities.

3. Echelon III

Care administered at this level requires clinical capability normally found in a medical treatment facility (MTF) that is typically located in a lower level enemy threat environment. The MTF is staffed and equipped to provide resuscitation, initial wound surgery, post operative treatment, and care that may include the first steps toward restoration of functional health.

4. Echelon IV

This echelon of care will provide not only a surgical capability but also further definitive therapy for patients in the recovery phase.

5. Echelon V

Care is convalescent, restorative, and rehabilitative and is normally provided by military, Department of Veteran Affairs, or civilian hospitals in CONUS.

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